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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/633,611	07/31/2003	Peter G. Webb	10021295-1	5564

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AGILENT TECHNOLOGIES, INC.
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EXAMINER	
MILLER, MARINA I	

ART UNIT	PAPER NUMBER
1631	

DATE MAILED: 08/26/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/633,611	WEBB ET AL.	
	Examiner	Art Unit	
	Marina Miller	1631	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *31 July 2003*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-40* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-40* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *31 July 2003* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date *7/31/03*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Applicants' filing on 7/31/2003 is acknowledged. Claims 1-40 are pending. Claims 1-40 presently are under examination.

Information Disclosure Statement

Information Disclosure Statement (IDS) filed 7/31/2003 has been considered in part. Examiner appreciates applicant's apprising her of copending application listed on the IDS. A reference crossed out on the IDS filed 7/31/2003 has not been considered because an original copending application which has not yet matured into an issued patent or otherwise become publicly available is not a proper document to be listed on PTO 1449 under 37 CFR 1.98(a).

Claim Objections

Claims 15, 22, and 25 are objected to because of the following informalities: claims 15, 22, and 25 contain typing errors. Claim 15 recites "instruction comprise" wherein it should read "instruction comprises." Claim 22 recites "one or more times each time" wherein it should recite "one or more times, each time" (*i.e.*, a comma is missing). Claim 25 recites " instructions for the array each retrievable" wherein it should recite " instructions for the array, each retrievable" (i.e., a comma is missing).

Appropriate correction is required.

Claim Rejections - 35 USC § 101

Non-Statutory Subject Matter

35 U.S.C. 101 reads as follows:

> Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

Claims 25-29 rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claims 25-29 recite a method comprising a step of retrieving an instruction. Claim 29 additionally recites steps of repeating the retrieving and charging accounts. "However, not all processes are statutory under 35 U.S.C. 101." *See* MPEP § 2106. The disclosed method does not recite physical steps to be performed in order to achieve the goal of the method. A step of retrieving is not limited to a physical step, and all other steps are merely those of repetitive data manipulation within a computer. The method does not actually transform a set of data.

When a computer-implemented method does not recite a physical step or an actual transformation of data, it may be statutory when the claimed invention as a whole accomplishes a practical application. "That is, it must produce a useful, concrete and tangible result." *See* MPEP § 2106. In the instant case, the result of the method is not clear. The claims do not recite tangible expression of the retrieving information and/or charging accounts, nor any actual (*i.e.*, concrete) result in a form useful to one skilled in the art. Thus, the method does not recite steps of producing something that is concrete, useful, and tangible, and is not statutory.

Lack of Utility

Claims 1-40 are rejected under 35 U.S.C. 101 because the claimed invention lacks patentable utility.

The specification fails to disclose any utility for the claimed invention. In addition, there is no well-established utility because there is no description of a specific result of the claimed method. Also, in order for the result of the claimed methods to be useful, one skilled in the art must be aware of the correlation between information received (*e.g.*, signal data read from an array) and a goal of the method (conditions to be diagnosed, study a particular disease, characteristics, expression, diagnostics, *etc.*). Absent any disclosure about an array identifier and correlation between the array identifier and the result of the method, there does not appear to be any immediate benefit to a member of the public for performing the method, and, hence, there is no utility for the method. No such information is recited in the instant claims; further research would be required to determine such a correlation or evaluate binding. Applicant is reminded that a "use" to perform further research is not a utility under 35 U.S.C. 101.

Claims 30-33 are directed to an apparatus performing steps of the method of claims 1, 6, and 17. Because the method does not have patentable utility, any apparatus would also be lacking utility. The apparatus performs a method, which produces no useful result, and one of ordinary skill in the art would not know for what purpose or to what useful end such a system might be used for, therefore, the invention lacks utility.

Claims 34-36 are directed to a computer readable medium programmed to execute a method of claims 1, 4, and 25, respectively. Because the method does not have patentable utility, a computer readable medium for performing the method also lacks utility.

Claim Rejections - 35 USC § 112

Enablement

The following is a quotation of the first paragraph of 35 U.S.C. 112:

> The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

There are many factors to be considered when determining whether there is sufficient evidence to support a determination that a disclosure does not satisfy the enablement requirement and whether any necessary experimentations is "undue." These factors include, but are not limited to:

a) The breadth of the claims;
b) The nature of the invention;
c) The state of the prior art;
d) The level of one of ordinary skill;
e) The level of predictability in the art;
f) The amount of direction provided by the inventor;
g) The existing of working examples; and
h) The quantity of experimentation needed to make or use the invention based on the content of the disclosure.

In re Wands, 858 F.2d 731, 737 (Fed. Cir. 1988).

The Board also stated that although the level of skill in molecular biology is high, the results of experiments in genetic engineering are unpredictable. 858 F.2d at 740. While all of these factors are considered, sufficient amount for a prima facie case are discussed below.

Claims 37-40 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

a) The claims are broad because they a method comprising a forwarding a result of a method 1 or 25. Claims 1 and 25 do not produce "a result." Claim 1 comprises steps of retrieving

an identifier and forwarding the identifier, a test request, and payment information to a remote location. It is not clear what the result is intended. Claim 25 recites a step of retrieving an instruction from a memory. It is also not clear what the result of the claim 25, an instruction, multiple instructions, processed signal data, etc.

b) The invention is drawn to an ordering method.

c) The prior art analysis shown that process for requesting biological experiments and for the delivery of experimental information requires producing a result in order to forward the result to a remote location. *See* Milosavijevic, fig. 3.

d) The skill of those in the art of molecular biology and bioinformatics is high.

e) The prior art shows large amounts of data are generated through array analysis and that data are transmitted remotely to and from a remote location to and from a user. *See* Milosavijevic, p. 9, line 15 through p. 12, *Electronic Data Transfer*.

f) The specification does not provide guidance for forwarding a result without knowing the result.

g) The specification does not provide any working examples.

h) In order to practice the claimed invention, one skilled din the art must randomly select a result of claimed method to forward it to a remote location and must guess what parameters to use for the obtaining a result for forwarding it to a remote location. This constitutes undue experimentation.

Due to the undue experimentation required to obtain the goal of the invention, the lack of directions presented in the specification, lack of working examples, and the state of the prior art,

the specification fails to teach one skilled in the art how to use the claimed method for one individual at a time.

Second Paragraph

The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1-24 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 1 recites the limitation "the signal data." There is insufficient antecedent basis for this limitation in the claim. Claim 1 recites the limitation "the array." There is insufficient antecedent basis for this limitation in the claim. Therefore, claim 1 is further indefinite. Claims 2-24, 30-36, and 37-38 depend from claim 1, and therefore also indefinite.

Claims 6 and 23 recite the limitation "the instruction comprises a sub-array pattern." Claims 6 and 23 depend from claim 1 which recites "requests an instruction on reading or processing the signal data from the array." It is not clear whether applicants intended an instruction for processing a sub-array pattern (*i.e.*, specific manner of reading/processing) or an instruction directing to process/read only a sub-array (*e.g.*, without actually specifying a manner of reading/processing). As it is not clear what limitation is intended, claims 6 and 23 are indefinite. Claims 7-13 and 31 depend form claim 6, and are also indefinite.

Claims 8 and 20 recite the limitation "additionally comprising reading signal data." Claim 8 depends from claims 1, 2, 3, and 6. Claim 20 depends from claims 1, 2, and 18. It is not

clear where the step of reading the array recited in claims 6 and 20 fits within steps recited in claims 1, 2, 3, and 6 and 1, 2, and 18, respectively, *i.e.*, when the step of reading is intended to occur. Claim 9 depends from claim 8. Thus, claims 8-9 and 20 are indefinite.

Claim 9 recites the limitation "additionally comprising exposing the array to a sample." Claim 9 depends from claim 1-3 and 6-8. It is not clear where the step of exposing the array recited in claim 9 fits within steps recited in claims 1-3 and 6-8, *i.e.*, when the step of reading is intended to occur. Claim 9 depends from claim 8, which recites "reading signal data from the array." In order to read data from an array, the array has to be first exposed to a sample. The limitation "exposing the array to a sample" has to precede "reading signal data from the array." Therefore, claim 9 does not appear to further limit claim 8. As it is unclear what limitations are intended, claim 9 is indefinite.

Claim 10 recites the limitation "each retrievable." It is not clear whether the limitation "each" refers to two memories recited in the claim, patterns, or the array. Claims 11-13 depend from claim 10. As the intended limitation is not clear, claims 10-13 are indefinite.

Claim 11 recites the limitation "signal data is acquired." It is not clear whether "acquiring" the signal data is intended to be an active, positive method step. As the intended limitation is not clear, claim 11 is indefinite.

Claim 12 recites the limitation (an additional step) "comprising generating a result." Claim 12 depends from claims 1-2, 6, and 10. It is not clear where the step of generating a result recited in claim 12 fits within steps recited in claims 1-2, 6, and 10, *i.e.*, when the step of generating a result is intended to occur. Claim 12 also recites "generating a result ... from those array feature locations." It is not clear what feature locations are intended. Claim 13 depends

from claim 12. As the limitations recited in claim 12 are not clear for the reasons stated above, claims 12-13 are indefinite.

Claim 16 recites a conjunction "or." It is unclear whether the instruction comprises data "or" a parameter; or whether the data is in the form of a computer code "or" a parameter. As the intended limitation is not clear, claim 16 is indefinite.

Claim 18 recites "the instruction for the array retrievable with the test request." It is not clear what is retrieved with the test request, *e.g.*, the instruction or the array. Claim 18 also recites the limitation "the read signal data." There is insufficient antecedent basis for this limitation in the claim. As the intended limitations are not clear, for the reasons set forth above, claim 18 is indefinite. Claims 19-21 and 22-23 depend from claim 18, and therefore also indefinite.

Claim 19 recites the limitation "instructions for the array each retrievable." It is not clear whether the limitation "each" refers to instructions or to the array. Thus, claim 19 is indefinite.

Claim 25 recites the limitation "each retrievable." It is not clear what is retrievable, *e.g.*, a memory, an instruction, or the array. Thus, claim 25 is indefinite. Claims 26-29, 36, and 39-40 depend from claim 25, and therefore also indefinite.

Claim 27 recites the limitation "the array identifier and the request are received." It is not clear whether "reception" is intended to be an active method step. Claims 28-29 depend from claim 27. As the limitation recited in claim 27 is not clear, claims 27-29 are indefinite.

Claim 28 recites the limitation " instruction is communicated." It is not clear "communication" is intended to be an active method step. As the limitation recited in claim 28 is not clear, claim 28 is indefinite.

Claim 29 recites the limitation "the receiving." There is insufficient antecedent basis for this limitation in the claim. Claim 29 also recites the limitation "is additionally received." It is not clear whether the "reception" steps are intended to be additional active method steps. Claim 29 recites the limitation "a method according to claim 27 wherein the receiving additionally comprising." This limitation refers to a step of "receiving" of claim 27. However, claim 27 only recites "the array identifier and the request are received." It is not clear whether the limitation "are received" is intended to recite an active method step, as set forth above. Claim 29 also recites the limitation "repeating the receiving and retrieving." Repeating of a step (*i.e.*, receiving) is only possible if the step is previously recited in claims 27 or 29. As it is not clear whether claim 27 or 29 comprise the step of "receiving," the intended limitation is unclear, and claim 29 is further indefinite.

Claims 37-40 recite a method comprising forwarding a result of a method of claim 1 or claim 25 to or from a remote location. It is not clear what method is intended because "a result" of the method of claims 1 or 25 is not disclosed. The method of claim 1 comprises retrieving an identifier and forwarding the identifier, a request, and payment information to a remote location. It is not clear what is forwarded in claims 37-38 because a request has been forwarded to a remote location in the method of claim 1. If the intended "result" is an act of "forwarding" to a remote location, than the method of claim 37 is equivalent to that of claim 1. It is also not clear what is forwarded (what is a result) to or from a remote location in claims 39-40, *e.g.* instructions, signal data, an array, *etc.* Thus, claims 37-40 are indefinite.

Claim Rejections - 35 USC § 102

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 37-40 are rejected under 35 U.S.C. 102(b) as being anticipated by Milosavijevic, WO 01/31333.

Milosavijevic discloses forwarding a result generated by a genomic service to and from a remote location [0064-0065], thus he anticipates claims 37-40.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-40 are rejected under 35 U.S.C. 103(a) as being unpatentable over Milosavijevic, WO 01/31333, in view of Venkatesan, U.S. Patent 6,282,550.

Milosavijevic discloses a method for requesting biological experiments from a provider and providing experimental services to a client. Milosavijevic discloses a step of retrieving from a memory or reading an array identifier for an array of probes (*see*, for example, p. 12, line 22 through p. 13, line, p. 13-14, bridging paragraph, p. 17, line 25-31, and p. 18, line 17-23), similar to instant claim 1. Milosavijevic discloses a step of forwarding the array identifier and a request for a test to a remote location (*see*, for example, p. 16, line 1-11, p. 18, line 12-23), similar to instant claim 1. Milosavijevic discloses transmitting information to a remote location (p. 13-14, bridging paragraph; fig. 1), similar to claims 1-2. Milosavijevic discloses receiving instructions for processing data obtained form an array form a remote location (*see*, for example, p. 17, line

4-15 client and p. 26, line 15 through p. 27, line 2, wherein a provider controls via a data analyzing software supplied to a), similar to instant claim 3-4 and 15-17. Milosavijevic discloses an instruction comprising a sub-array pattern indicating that only the sub-set data are to be analyzed (p. 26, line 15 through p. 27, line 13), similar to instant claims 6-7 and 10-13. Milosavijevic discloses contacting an array with a sample and reading signal data from the array (p. 16, line 16-31), similar to instant claim 8-9. Milosavijevic discloses forwarding read signal data to a remote location and receiving a result based on an instruction retrieved from a memory (p. 17, line 4-15 and p. 19, line 5-14), similar to instant claims 18 and 23. Milosavijevic discloses that a client may modify and redesign previously submitter experiments based on the results of the analysis of previously completed experiments (*i.e.*, results are received based on multiple instructions retrievable with a different test requests) (p. 13-14, bridging paragraph), similar to instant claims 19-20 and 22.

Milosavijevic discloses that client requests an array based on a client-specified target (*e.g.*, a list of genes, a list of SNPs, a list of proteins) for which specific arrays are developed (p. 12, line 22-31). Samples and arrays are identified for tracking with a digital index enabling a client remotely submit a request, receive data, and query the status (p. 13-14, bridging paragraph). Further, a provider provides an array according to a customer's request, interrogates the array, and provides instructions for the specific analysis (p. 19, line 15-25). A provider supplies multiple instructions (a system software) for each array retrievable with combination of an array identifier and a test request (p. 26, line 15 through p. 27, line 13). A client may modify an experiment based on past results. A communication between client and a provider takes place

over a network (p. 10, line 27-31). Thus, Milosavijevic discloses a method similar to that recited in instant claims 25-28.

Milosavijevic discloses an apparatus comprising an array reader that comprises a light source illuminating an array and a detector detecting light. Milosavijevic also discloses a processor (a computer equipped with a program performing method steps) (p. 16, line 16 though p. 17, line 15). Thus, Milosavijevic discloses an apparatus similar to that recited in instant claims 30-33, and a computer readable medium similar to that recited in instant claims 34-36. Results of the method are forwarded to and received from a remote location (p. 17, line 4-15), similar to instant claims 37-40.

Although Milosavijevic refers to "purchasing" (*see* fig. 18), he does not specifically disclose forwarding payment information, receiving a quoted price for the test requested, account identification, and charging an account.

Venkatesan discloses a method for providing information to a customer requesting a synthesis of primers wherein the customer provides a probe identifier (fig. 6A) and requests and receives information via a network (fig. 5). Venkatesan also discloses a second user selection of a product based on the first product data provided to the user (col. 3-4) (*i.e.*, repeated instructions). Venkatesan further discloses that a provider may automatically bill a customer via the network (col. 3, line 40-49). In order to bill a customer, the provider has to create an account for the user and adjust price to the price agreed between the customer and a supplier (col.3, line 27-41). Thus, Venkatesan inherently discloses identifying an account and adjusting the account to product pricing. Venkatesan teaches selling a product to a user base upon the modified price

(col. 3-4). Venkatesan teaches remote communication between a provider and a customer (fig. 5).

It would have been obvious to one skilled in the art at the time of the invention to modify the method of Milosavijevic to communicate pricing information to and from a customer ordering a product, to create an account for billing a customer on-line, and to sell a product after a series of modifications conducted on-line, such as taught by Venkatesan, where the motivation would have been to provide efficient and less time consuming process of buying a biological product to customers, as taught by Venkatesan, col. 1.

Claims 1-40 are rejected under 35 U.S.C. 103(a) as being unpatentable over Anderson WO 01/80155, in view of Venkatesan, U.S. Patent 6,282,550.

Anderson discloses a method for a custom-designed biological array design and analysis. Anderson discloses steps of retrieving or reading an array identifier and forwarding the identifier and a request for a test to a remote location (p. 8, line 25 through p. 9, line 25), similar to instant claims 1-2. Anderson discloses receiving instructions from a remote locations, reading signal data according with the instructions, and repeating reading and forwarding, wherein instructions comprise instructions to read a sub-array (*e.g.*, a sub-array is a previous array used for further improvements if a customer is not satisfied with the result) (p. 10, line 7-27; p. 12, line 15-32; p. 26-27, bridging paragraph), similar to instant claims 3-7, 10-13, and 23. Anderson discloses exposing an array to a sample and reading the array (p. 24, line 21-30), similar to instant claims 8-9. Anderson discloses processing an array based on received instructions (p. 10, line 9-27; p. 12, line 15-32; p. 18, line 10-15), similar to instant claims 15-17. Anderson discloses forwarding

signal data to a remote location and receiving a result (p. 10, line 9-27), similar to instant claim 18. Anderson discloses a repetitive retrieval of multiple instructions (p. 12, line 15-32; p. 26-27, bridging paragraph), similar to instant claims 19-20 and 22-23. Anderson discloses that a user might only be interested if a sample contains specific DNA without specifying what DNA sequences exactly is to be laid down at each spot (p. 14, line 27-33), similar to claim 24.

Anderson discloses a method comprising retrieving instructions for processing data read from an array wherein the instructions are retrievable with different test requests (p. 10, line 9-27), similar to instant claims 25-26. Anderson discloses communication to and from a remote location (p. 8, line 25-31), similar to instant claims 27-28 and 37-40.

Anderson discloses an apparatus comprising an array reader and a processor comprising a program executing Anderson's method (p. 8, line 12-22 and fig. 3f), similar to the apparatus recited in instant claims 30-33. Anderson discloses a computer readable medium because a computer executes Anderson's programs (p. 8, line 12-22; p. 9-10, bridging paragraph; p. 14, line 21-33), similar to that recited in instant claims 34-36.

Anderson does not disclose forwarding payment information, receiving a quoted price for the test requested, account identification, and charging an account.

Venkatesan discloses a method for providing information to a customer requesting a synthesis of primers wherein the customer provides a probe identifier (fig. 6A) and requests and receives information via a network (fig. 5). Venkatesan also discloses a second user selection of a product based on the first product data provided to the user (col. 3-4) (*i.e.*, repeated instructions). Venkatesan further discloses that a provider may automatically bill a customer via the network (col. 3, line 40-49). In order to bill a customer, the provider has to create an account

for the user and adjust price to the price agreed between the customer and a supplier (col.3, line 27-41). Thus, Venkatesan inherently discloses identifying an account and adjusting the account to product pricing. Venkatesan teaches selling a product to a user base upon the modified price (col. 3-4). Venkatesan teaches remote communication between a provider and a customer (fig. 5).

It would have been obvious to one skilled in the art at the time of the invention to modify the method of Anderson to communicate pricing information to and from a customer ordering a product, to create an account for billing a customer on-line, and to sell a product after a series of modifications conducted on-line, such as taught by Venkatesan, where the motivation would have been to provide efficient and less time consuming process of buying a biological product to customers, as taught by Venkatesan, col. 1.

Claims 1-4, 6-21, 23-40 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cattell, U.S. Patent 6, 180,351, in view of Venkatesan, U.S. Patent 6,282,550.

Cattell discloses a method for fabricating an addressable array. The method comprises steps of retrieving an array identifier and forwarding the identifier and a test request to a remote location (col. 4, line 11-43), similar to the instant method recited in claims 1-2. Cattell discloses receiving instructions in response from remote location and processing signal data according to the instructions (col. 12, line 1-35), similar to instant claims 3-4. Cattell discloses reading sub-array (col. 12, line 23-27), similar to instant claims 6-7, 10-13, and 23. Cattell discloses exposing an array to a sample and reading signals from the array (col. 11-12, bridging paragraph), similar to instant claims 8-9. Cattell discloses receiving instructions (array layout information) for

processing read signal data (col. 12, line 18-35), similar to instant claims 15-17. Cattler discloses forwarding read signal data (raw data) to a remote location for processing and receiving results based on instructions (layouts) for each test request (col. 12, line 1-35), similar to instant claims 18-20 and 24.

Cattler discloses a method of retrieving instructions from a memory using combination of a test request and an array identifier (col. 11, line 61 through col. 12, line 35), similar to instant claims 25-28.

Cattler discloses an apparatus comprising an array reader and a processor wherein a reader may comprise a light source and a detector (col. 10, line 17-29 and line 45-64; col. 12, line 1-35), similar to instant claims 30-33. Cattell discloses a computer readable medium for performing his methods (col. 5, line 11-45), similar to instant claims 34-36. Cattell discloses forwarding and receiving information to and from a remote location (col. 12, line31-35), similar to instant claims 37-40.

Cattell does not disclose forwarding payment information, receiving a quoted price for the test requested, account identification, and charging an account.

Venkatesan discloses a method for providing information to a customer requesting a synthesis of primers wherein the customer provides a probe identifier (fig. 6A) and requests and receives information via a network (fig. 5). Venkatesan also discloses a second user selection of a product based on the first product data provided to the user (col. 3-4) (*i.e.*, repeated instructions). Venkatesan further discloses that a provider may automatically bill a customer via the network (col. 3, line 40-49). In order to bill a customer, the provider has to create an account for the user and adjust price to the price agreed between the customer and a supplier (col.3, line

27-41). Thus, Venkatesan inherently discloses identifying an account and adjusting the account to product pricing. Venkatesan teaches selling a product to a user base upon the modified price (col. 3-4). Venkatesan teaches remote communication between a provider and a customer (fig. 5).

It would have been obvious to one skilled in the art at the time of the invention to modify the method of Cattell to communicate pricing information to and from a customer ordering a product, to create an account for billing a customer on-line, and to sell a product after a series of modifications conducted on-line, such as taught by Venkatesan, where the motivation would have been to provide efficient and less time consuming process of buying a biological product to customers, as taught by Venkatesan, col. 1.

Conclusion

No claims are allowed.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marina Miller whose telephone number is (571)272-6101. The examiner can normally be reached on 8-5, M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ardin Marschel, Ph. D. can be reached on (571)272-0718. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Marina Miller
Examiner
Art Unit 1631

MARJORIE A. MORAN
PRIMARY EXAMINER

Marjorie A. Moran
8/10/05

MM